

## **ABSTRACT**

This invention discloses an intra-frame complexity based dynamic GOP system and method for the encoding of MPEG-2 video streams. The present invention may be used as a rate control tool to improve video quality. The selective insertion of low complexity I frames in scene changes such as fades is disclosed. It is disclosed that the selective use of I frames in certain scene change situations can improve encoder performance, particularly when encoding at a low bit rate.